

**IN THE UNITED STATES PATENT AND TRADEMARK OFFICE**

In re application of :

Appl. No.10/625,149 : Confirm. No. 8274  
H. Downman McCarty, Jr. :  
Brooke Schumm III :  
Peter Popper, Applicants : Examiner: O. Flores Sanchez  
Filed: July 23, 2003 : Group Art Unit 3724

**For: AN ANTI-SPALLING COMBINATION ON AN IMPACT TOOL  
WITH AN IMPROVED HOLDING SYSTEM**

Honorable Commissioner of Patents and Trademarks  
Mail Stop Patent Application, P.O. Box 1450  
Alexandria, VA 22313-1450

**CONTINUATION AND PRIORITY DATA**

Continuation in part of PCT/US02/23448 and entry into the national stage of  
PCT/US02/23448, continuation in part of U.S. provisional applications 60/307,198 filed  
on July 23, 2001, and 60/356,804 filed on February 13, 2002

**SECOND AMENDMENT AND RESPONSE TO OFFICE ACTION OF Nov. 21,  
2005 and Notice of Non-Compliant Amendment dated 5/23/2006**

Petition is was made with the Amendment and Response to Office Action of Nov.  
21, 2005 for a 5 month extension of the shortened statutory period and the proper fee of  
\$1080.00 was paid

All claims, including withdrawn claims are now listed.

## **RESPONSE TO REQUEST FOR RESTRICTION**

In response to the Office Action of November 21, 2005, an election is made to Species XII: Embodiment of Fig. 11A-11C.

The applicants believe that claims setting forth a genus covering this embodiment are allowable, but have set out a species, and the claims have been narrowed and re-written. The polymeric materials useable in the invention are materials similar to the species that have a higher modulus, and often have a somewhat higher melting point which is typical of what would be thought of as harder polymers, i.e., higher modulus polymers.

Not only do prior references or art not show nor suggest this invention in any general way, but no reference discusses the use of fiber-reinforced shaped polymeric materials for impact tools.

The point of novelty rests in the design of the cap, and selection of suitable material science characteristics of the polymer and consequent determination of modulus, thickness, and area. A lower modulus material, that is a softer material, could be used, but the thickness would tend to have to be less or the cross section greater or insufficient energy would be transmitted to a tool to enable it to be effective.

Specifically, claim 143 contains elements that define the interplay of modulus, cross-section and thickness required to accomplish the invention. A specific illustration is set out on page 5/29 of the application:

“The material would still effectively perform the designated task while protecting the shaft of the chisel, meaning that the number of impacts to fail a standard rod or perform a standard task would not increase by more than 40%. For instance, for a drill rod cut on average by 10 strokes by a hammer applied to a chisel, with the chisel modified by this invention, the

number of strokes by the same hammer under the same conditions would average 14 or less.”

The claims have been re-written by canceling previous claims and preserving the dependent claims related to the generic and species claims associated with the embodiment.

The independent claims read on Species XII. Other details that read on features shown in other figures are presented in the dependent claims as suggested by the examiner.

#### **Amendments to the Claims**

Claims 1-122 are withdrawn and cancelled. Applicant has retained the right to present the method claims set out in claims 118-122 in a divisional application, and preserves the right to present the unelected claims. New claims numbered 123-142 were presented in the prior office action. Claims 123-142 are withdrawn and cancelled, though the right to present other species in a divisional application is reserved.

Claims 143-174 are presented as new claims.

The claims are presented at the end of the document.

Respectfully,

\_\_\_\_\_/Brooke Schumm III/\_\_\_\_\_/s/ Brooke Schumm III  
Brooke Schumm III  
Patent Bar Registration No. 34,926  
Danecker, McIntire et al  
One N. Charles St., Suite 2450  
Baltimore, MD 21201  
(410) 649-4761  
Attorney for Applicants